

8.0 Acronyms and Glossary

AC	Alternating current
AERL	ARCO Environmental Remediation Limited
AFS	AIRS facility subsystem
Alliance	Alliance Acoustical Consultants, Inc.
AM	Amplitude modulation
AN	Audible noise
ANG	Alberta Natural Gas Company
ANSI	American National Standards Institute
APW	Anaconda-Pintler Wilderness
AQRV	Air quality related value
ARCO	Atlantic Richfield Company
ARM	Administrative Rules of Montana
ASA	Acoustical Society of America
ACSR	Aluminum-conductor steel-reinforced
ASiMI	Advanced Silicon Materials, Inc.
ASME	American Standards of Mechanical Engineers
ASTM	American Society of Testing and Materials
ATV	All terrain vehicle
BACT	Best available control technology
BIL	Basic insulation level
BLM	Bureau of Land Management
BMP	Best management practice
BOR	U.S. Bureau of Reclamation
BPA	Bonneville Power Administration
BSA	Big Sky Acoustics, LLC
BSB	Butte-Silver Bow
BTEX	Benzene, toluene, ethylbenzene, xylene
BTU	British thermal unit
CaCO ₃	Calcium carbonate
CEIC	Montana Department of Commerce, Census, and Economic Information Center
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act (Superfund)
CES	Continental Energy Services, Inc.
CESQG	Conditionally exempt small quantity generator
CFC	Chlorofluorocarbon
CFR	Code of Federal Regulations
cfs	Cubic feet per second
CH ₄	Methane

CO	Carbon monoxide
CO ₂	Carbon dioxide
COE	U.S. Army Corps of Engineers
CRABS	Cultural Resource Annotated Bibliography System
CRIS	Cultural Resource Information System
CRP	Conservation Reserve Program
CTG	Combustion turbine generator
dB	Decibel
dB(A)	A-weighted decibel scale
DC	Direct current
DEM	Digital elevation model
DEQ	Montana Department of Environmental Quality
DNRC	Montana Department of Natural Resources and Conservation
DOE	U.S. Department of Energy
DOT	U.S. Department of Transportation
EA	Environmental assessment
EC	Ethos Consultants
EIS	Environmental impact statement
EMF	Electric and magnetic fields
EPA	U.S. Environmental Protection Agency
EPRI	Electric Power Research Institute
EPT	Ephemeroptera, Plecoptera, and Trichoptera
ESRI	Environmental Systems Research Institute
ESA	Endangered Species Act
ESD	Explanation of significant differences
°F	Degrees Fahrenheit
FAA	Federal Aviation Administration
FCC	Federal Communication Commission
FCCC	United Nations Framework Convention of Climate Change
FCR	Fire cracked rock
FEMA	Federal Emergency Management Agency
FERC	Federal Energy Regulatory Commission
FS	U.S. Department of Agriculture Forest Service
ft	Feet
ft/s	Feet per second
FWP	Montana Department of Fish, Wildlife, and Parks
GE	General Electric
GHG	Greenhouse gas
GIS	Geographic information system

gpd	Gallons per day
gpm	Gallons per minute
g/m ²	Grams per square meter
GPS	Global positioning system
GRI	Gas Research Institute
g.s.	Growing season
GT	Gas turbine
GWP	Global warming potential
HAP	Historic archaeological property
H-A&E	Historic architectural and engineering property
HCFC	Hydrochlorofluorocarbon
HFC	Hydrofluorocarbon
HHV	High heating value
HMMH	Harris, Miller, Miller, and Hanson, Inc.
HNO ₃	Nitric acid
HP	High pressure
HPL	Havre pipeline
HRSG	Heat recovery steam generator
HUC	Hydraulic unit code
in/hr	Inches per hour
IPCC	Intergovernmental Panel on Climate Change
ISC	Industrial source complex
ISO	International Organization for Standardization
kcml	Kilo circular mils
kg	Kilogram
kg/ha/yr	Kilograms per hectare per year
km	Kilometer
kV	Kilovolt
LAD	Land application and disposal area
LAER	Lowest achievable emission rate
lb	Pound
LCS	Legacy Consulting Services
L _{dn}	Day-night average noise level
L _{eq}	Equivalent noise level
LHV	Low heating value
LOP	Life of project
LP	Low pressure
LWCF	Land and Water Conservation Fund

MAAQS	Montana ambient air quality standards
MBMG	Montana Bureau of Mines and Geology
MBTSG	Montana Bull Trout Scientific Group
MCA	Montana Code Annotated
MDOT	Montana Department of Transportation
MEPA	Montana Environmental Policy Act
MFSA	Montana Major Facilities Siting Act
mgd	Million gallons per day
mg/L	Milligrams per liter
MGWPCS	Montana groundwater pollution control system
MHz	MegaHertz
MM	Modified Mercalli
MMcf	Million cubic feet
mmhos/cm	Millimhos per centimeter
MNHPDB	Montana Natural Heritage Program Database
MPC	Montana Power Company
MPDES	Montana pollutant discharge elimination system
MRI	Montana Resources, Inc.
MRIS	Montana River Information System
mS/cm	MicroSiemens per centimeter
m/sec	Meters per second
MTGAP	Montana gap analysis
MTNHP	Montana Natural Heritage Program
MVA	Megavolt-ampere
MW	Megawatt
MWh	Megawatt hour
N	Nitrogen
NAA	Nonattainment area
NAAQS	National ambient air quality standard
NAPP	National aerial photograph program
NARBA	North american regional broadcasting agreement
NCDC	National Climatic Data Center
NEPA	National Environmental Policy Act
NESC	National electric safety code
NFPA	National Fire Protection Agency
NH ₄	Ammonia
NHPA	National Historic Preservation Act
NIHL	Noise induced hearing loss
NIMEX	New York Market Exchange
NIOSH	National Institute for Occupational Safety and Health
NM VOC	Non-methane volatile organic compound
N ₂ O	Nitrous oxide

NO _x	Nitrogen oxide
NOVA	TransCanada's Alberta System
NPDES	National pollutant discharge elimination system
NPS	U.S. Department of the Interior National Park Service
NRCS	Natural Resources Conservation Service
NRHP	National Register of Historic Places
NRIS	Natural Resource Information System
NTU	Nephelometric units
NWI	National wetland inventory
O ₃	Ozone
OLM	Ozone limiting method
OSHA	Occupational Health and Safety Administration
%	Percent
PAP	Prehistoric archaeological properties
PFC	Perfluorocarbon
P.L.	Public Law
PM ₁₀	Particulate matter with a diameter less than 10 micrometers
Power	Power Engineering, Inc.
PP	Paleontological property
PRP	Potentially responsible party
PSD	Prevention of significant deterioration
psi	Pounds per square inch
psig	Pounds per square inch gauge
PUC	Public Utilities Commission
RCRA	Resource Conservation and Recovery Act
REIS	Regional Economic Information System
REL	Recommended exposure limit
RI	Radio interference
RN	Radio noise
ROD	Record of decision
ROZ	Restricted operating zone
ROW	Right-of-way
RTI	Renewable Technologies, Inc.
RTO	Regional transmission organization
RTU	Remote telemetry unit
SAR	Sodium absorption ratio
SBGP	Silver Bow generation plant
SCRAM	State consolidated RCRA authorization manual
SCADA	Supervisory control and data acquisition

SCR	Selective catalytic reduction
SF	Sulfur hexafluoride
SHPO	State historic preservation office
SLWS	Silver Lake water system
SNR	Signal-to-noise ratio
SO ₂	Sulfur dioxide
sp.	Species (singular)
SPCC	Spill prevention control and countermeasure
spp.	Species (plural)
STG	Steam turbine generator
SWPC	Siemens Westinghouse Power Corporation
SWPPP	Storm water pollution prevention plan
TCPL	TransCanada Pipelines System
TDS	Total dissolved solids
TIFID	Tax increment financing industrial district
TMDL	Total maximum daily load
TPI	Total personal income
tpy	Tons per year
TVI	Television interference
TWA	Time-weighted average
µg/m ³	Micrograms per cubic meter
µm	Micrometer
U.S.C.	United States Code
USCS	Unified soil classification system
USDA	United States Department of Agriculture
USDI	United States Department of the Interior
USFWS	United States Fish and Wildlife Service
USGS	United States Geological Survey
UTM	Universal Transverse Mercator
VOC	Volatile organic compound
VRM	Visual resources management
WESTECH	Western Technology and Engineering, Inc.
WETP	Wetland perimeter inflection point
WMA	Wildlife management area
WSCC	Western Systems Coordinating Council
WUS	Waters of the United States
YNP	Yellowstone National Park
YOY	Young-of-the-year

Glossary

ACSR: Aluminum conductor, steel reinforced.

Air Pollution: Dust, fumes, smoke, other particulate matter, vapor, gas odorous substance or any combination of these.

Alluvial: Composed of alluvium or deposited by a stream or running water.

Alluvium: A general term for all deposits resulting from the operations of modern rivers and creeks, including the sediments laid down in riverbeds, floodplains, and fans at the foot of mountain slopes.

Ambient Air Quality Standard: An established concentration, exposure time, and frequency of occurrence of air contaminant(s) in the ambient air that shall not be exceeded.

Ambient Level: The existing level of air pollutants, noise, or other environmental factors used to describe background conditions (i.e., conditions before a project is implemented).

Anticlinal: Occurring at right angles to the surface.

Apiary: A place where bees are kept.

Benthic: of, relating to, or occurring at the bottom of a body of water.

Best Available Control Technology (BACT): An EPA requirement that all major new plants use to limit their emissions. Used to prevent significant deterioration (PSD) of air quality in areas that were already in attainment of the National Air Quality Control Standards.

Best Management Practices (BMP): A practice or combination of practices that are determined to be the most effective and practicable (including technological, economic, and institutional considerations) means of controlling point and nonpoint pollutants at levels compatible with environmental quality goals.

Biface: A bifacial stone tool.

Big Game: Those species of large mammals normally managed as a sport hunting resource.

Cairn: A heap of stones piled up as a memorial or as a landmark

Chert: A rock resembling flint and consisting essentially of a large amount of fibrous chalcedony with smaller amounts of cryptocrystalline quartz and amorphous silica.

Colluvial: Rock detritus and soil accumulated at the foot of a slope.

Cultural Resources: Those fragile and nonrenewable remains of human activities, occupations, and endeavors as reflected in sites, buildings, structures, or objects, including works of art, architecture, and engineering.

Curation: The care of an object or collection by a curator (one that has the care and superintendence of something; especially: one in charge of a museum, zoo, or other place of exhibit).

Decibel (dB): A unit of measure for sound.

dB(A): Stands for A weighted decibels. This decibel scale is used to approximate the way human hearing responds more to some frequencies than to others.

Emergent Wetland: Any area of a vegetated wetland where non-woody vegetation (e.g. cattail, grasses, sedges) comprises at least 30 percent areal cover.

Electric and Magnetic Fields (EMF): Electric and magnetic fields (EMFs) are produced by power lines, electrical wiring, and electrical equipment. EMFs are invisible lines of force that surround any electrical device.

Emission: The release of air contaminants into the ambient air.

Emission Standard: A requirement established under the federal Clean Air Act which limits the quantity, rate, or concentration of emissions of air contaminants on a continuous basis.

Ephemeral Drainage: A stream or stream segment that flows only briefly in response to local precipitation and has no base flow.

Explanation of Significant Differences (ESD): An Environmental Protection Agency document explaining modifications to original clean up plans for Superfund sites.

Fugitive Dust: A particulate emission made airborne by forces of wind, human activity, or both. Unpaved roads, construction sites, and tilled land are examples of areas that originate fugitive dust.

Glaciated: To subject to glacial action; also: to produce glacial effects in or on.

Granodiorite: A granular intrusive quartzose igneous rock intermediate between granite and quartz-containing diorite with plagioclase predominant over orthoclase.

Intermittent Stream: A stream that flows in a well-defined channel in response to precipitation and is dry for part of the year.

Intermodal: Involving transportation by more than one form of carrier during a single journey.

Intermont: Situated between mountains.

Kcmil: The cross sectional area of the conductor expressed on a basis of one thousand circular mils.

Lacustrine: Of, relating to, formed in, living in, or growing in lakes.

Lowest Achievable Emission Rate (LAER): EPA term to describe the rate that all new emission sources in nonattainment areas must meet by using pollution controls

Lithic: Of, relating to, or being a stone tool.

Liquefaction: The process of making or becoming liquid.

Mesic: characterized by, relating to, or requiring a moderate amount of moisture.

Modified Mercalli (MM): A scale of earthquake intensity ranging from I for an earthquake detected only by seismographs to XII for one causing total destruction of all buildings.

Nephelometric units (NTU): A measure of the concentration or particle size of suspensions by means of transmitted or reflected light.

Nitric Oxide: A gas that reacts with oxygen to form nitrogen dioxide.

Nitrogen Dioxide (NO₂): A reddish brown gas that is a component of smog.

Nitrogen Oxides (NO_x): A group of compounds containing varying proportions of nitrogen and oxygen.

Nonattainment: Description of areas of the county not yet in compliance with National Ambient Air Quality Standards.

Non-jurisdictional: Waters over which the U.S. Army Corps of engineers has no interest or authority, such as irrigation canals or ditches.

Noxious Weed: Exotic (non-native) species of plants that proliferate and reduce the value of land for agriculture, forestry, livestock, wildlife, or other beneficial uses.

Outmigrate: To migrate out of a place. In this case it refers to juvenile fish that migrate from their spawning and rearing habitats (a stream) out to a larger adult habitat (river or lake).

Pediment: A broad gently sloping bedrock surface with low relief that is situated at the base of a

steeper slope and is usually thinly covered with alluvial gravel and sand.

Periphyton: Organisms (as some algae) that live attached to underwater surfaces.

Reconductoring: The process whereby new cabling (conductors) are sized appropriately and attached to poles or towers in a single stranded wire format or bundled in a pattern that will enable the transmission of the electricity within the required current and voltage capacity per design.

Right-of-way (ROW): The right to pass over property owned by another. The strip of land over which facilities such as roadways, railroads, pipeline, or powerlines are built.

Redd: The spawning ground or nest of various fishes.

Salmonid: Any of a family (Salmonidae) of elongate bony fishes (as a salmon or trout) that have the last three vertebrae upturned.

Special Status Species: Those species of plants or animals that have a protective status designated by a state or federal agency because of general or localized population decline.

Superfund: A federal program enacted to clean up hazardous waste sites around the United States. Superfund was created under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA).

Tertiary: The Tertiary period or system of rocks.

Total Maximum Daily Load (TMDL): The total amount of a pollutant, per day, (including a margin of safety) that a waterbody may receive from any source (point, nonpoint, or natural background) without exceeding the state water quality standards. The term frequently refers to a plan or strategy to return a waterbody to compliance with the water quality standards and therefore fully supporting of its designated uses.

Topsoil: Fertile soil or soil material, usually rich in organic matter, used to top dress disturbed areas. Topsoil is better suited to supporting plants than other materials.

Tuffaceous: A rock composed of the finer kinds of volcanic detritus usually fused together by heat.

Viewshed: The landscape that can be directly seen under favorable atmospheric conditions, from a viewpoint or along a transportation corridor.

Visual Resources Management System (VRM): The degree of acceptable visual change within a characteristic landscape. A class is based upon the physical and sociological characteristics of any given homogenous area as a management objective.

Wetlands: Areas that are inundated by surface or ground water with a frequency sufficient to support and under normal circumstances, does or would support a prevalence of vegetative or aquatic life that requires saturated or seasonally saturated soil conditions for growth and reproduction.

Volatile Organic Compound (VOC): Any of several compounds of carbon that participate in atmospheric photochemical reactions, forming secondary pollutants.

Xeric: Characterized by, relating to, or requiring only a small amount of moisture.